LAND APPLICATION OF BIOSOLIDS STAN SHIFFLETT

LO81 (FIELDS 1, 3, 4) LOUISA COUNTY, VIRGINIA JULY 2011





June 5, 2012

Mr. Ed Stuart Dept of Environmental Quality Northern Virginia Regional Office 13901 Crown Court Woodbridge, VA 22193

Dear Mr. Stuart:

Transmitted herein for your consideration is land application site for Stan Shifflett (designated as LO 81, fields 1, 3-4), located in Louisa County, Virginia. This submission contains strictly site specific information. Please refer to the operations and maintenance manual submitted under separate cover for all non-site specific information.

Do not hesitate to contact me at (804) 443-2170 should you have any questions or require additional information.

Sincerely,

Kelly M. Love

Technical Services Director

KML/cmw



FIELD SUMMARY SHEET

Stan Shifflett LO81

SYNAGRO FIELD #			FSA TRACT #	1901/1909/00	TOPO QUAD	
81-01	29.7	29.3			Louisa	Shifflett, Stanley & Cathleen
81-03	44.1	42.1			Louisa	Shifflett, Stanley & Cathleen
81-04	30.4	30.2			Louisa	Shifflett, Stanley & Cathleen
TOTALS:	104.2	101.6				

VIRGINIA POLLUTION ABATEMENT APPLICATION FORM D: MUNICIPAL EFFLUENT AND BIOSOLIDS

PART D-VI: LAND APPLICATION AGREEMENT - BIOSOLIDS AND INDUSTRIAL RESIDUALS

Table 1.: Parcels auth Tax Parcel ID 11 35 44-12 acres	agricultural sites identifie	ad below in Table 1 and identifies, water treatment residuals or Tax Parcel ID	ed on the tax map(s) attached
Tax Parcel ID 11 35 44.12 acres	Tax Parcel ID	Tax Parcel ID	
11 35 44.12 acres	11 35A		Tax Parcel ID
	8 44 acres		A.
- The state of the			
Additional parcels containing Land	1 Application Sites are Identified	on Supplement A (check if applicable	1
ave no other agreements fonditions change such that		fields identified herein. I will no available to the permittee for a	
ntified above and in Exhib ove, before, during or after	It A. I also grant permissi land application of permi	ly residuals as specified below ion for DEQ staff to conduct ins itted residuals for the purpose of	spections on my land identified
Sessible Biosolids Water Yes No 2 Yes CHA CEVY Y SV		aves one shiftlett	ther industrial sludges Yes □ No P.O. BOX 1176 Whg Address LOUISA, Va
ermittee:	he permittee, agrees to a	pply biosolids and/prindustrial quation and in amounts not to	residuals on the landowner's
e nutrient management pla 0.1-104.2 of the Code of \ nd application has comme	in prepared for each land /irginia. Permittee will pronced. If the plan requires	application field by a person of covide a copy of the NMP to the modification to reflect the actual of the modification to the modification to reflect the actual of the modification.	ertified in accordance with landowner within 30 days afte al application rates or farming
		signee of the proposed schedu vner's land. Notice shall includ	le the source of residuals to be
Russon	Las Roman		Tide water Trail lain, VA 22 438

Printed Name

VIRGINIA POLLUTION ABATEMENT APPLICATION PART D-VI LAND APPLICATION AGREEMENT Permittee: Permit # or County: Low SG Landowner Uth Leevy Y. Stifflet Farm name or address: Level Acres Fav

Landowner Site Management Requirements:

I, the landowner, I have received a DEQ Biosolids Fact Sheet that includes information regarding regulations governing the land application of biosolids, the components of biosolids and proper handling and land application of biosolids.

I have also been expressly advised by the Permittee that the site management requirements and site access restrictions identified below must be complied with after biosolids have been applied on my property in order to protect public health, and that I am responsible for the implementation of these practices.

I agree to implement the following site management practices at each site under my ownership following the land application of biosolids at the site:

Notification Signs: I will not remove any signs posted by the Permittee for the purpose of identifying my fleid
as a biosolids land application site, unless requested by the Permittee, at least 30 days after land application
at that site was completed.

2. Public Access

- Public access to land with a high potential for public exposure shall be restricted for at least one year following any application of biosolids.
- Public access to land with a low potential for public exposure shall be restricted for at least 30 days
 following any application of biosolids. No biosolids amended soil shall be excavated or removed from
 the site during this same period of time unless adequate provisions are made to prevent public
 exposure to soil, dusts or aerosols;
- c. Turf grown on land where biosolids are applied shall not be harvested for one year after application of biosolids when the harvested turf is placed on either land with a high potential for public exposure or a lawn, unless otherwise specified by the permitting authority

3. Crop Restrictions:

- Food crops with harvested parts that touch the biosolids/seil mixture and are totally above the land surface shall not be harvested for 14 months after the application of biosolids.
- Food crops with harvested parts below the surface of the land shall not be harvested for 20 months
 after the application of biosolids when the biosolids remain on the land surface for a time period of
 four (4) or more months prior to incorporation into the soil.
- c. Food crops with harvested parts below the surface of the land shall not be harvested for 38 months when the biosolids remain on the land surface for a time period of less than four (4) months prior to incorporation.
- Other food crops and fiber crops shall not be harvested for 30 days after the application of biosolids;
- Feed crops shall not be harvested for 30 days after the application of biosolids (60 days if fed to lactating dairy).

4. Livestock Access Restrictions:

Following biosolids application to pasture or hayland sites:

- a. Meat producing livestock shall not be grazed for 30 days.
- b. Lactating dairy animals shall not be grazed for a minimum of 60 days.
- Other animals shall be restricted from grazing for 30 days;
- Supplemental commercial fertilizer or manure applications will be coordinated with the biosolids and industrial
 residuals applications such that the total crop needs for nutrients are not exceeded as identified in the
 nutrient management plan developed by a person certified in accordance with §10.1-104.2 of the Code of
 Virginia;
- Tobacco, because it has been shown to accumulate cadmium, should not be grown on landowner's land for three years following the application of biosolids or industrial residuals borne cadmium equal to or exceeding 0.45 pounds/acre (0.5 kilograms/hectare).

Rev 10/03/2011

Stanley W Stryflet

Tax ID Landowner Identification Sheet

Landowner	Field #	Tax ID
SHIFFLETT, STANLEY W & CATHLEEN Y	81-01	11 - 35
SHIFFLETT, STANLEY W & CATHLEEN Y	81-03	11 - 35, 35A
SHIFFLETT, STANLEY W & CATHLEEN Y	81-04	11 - 35

Field #	Latitude (north)	Longitude (west)	
81-01	38° 05' 22.71"	78° 06' 24.08"	
81-03	38° 05' 10.18"	78° 06' 28.22"	
81-04	38° 05' 03.72"	78° 06' 17.09"	

Haul Route:

The location maps in conjunction with the above latitude and longitude coordinates are a route planning tool meant to be a guide to indicate suggested haul routes for various preferences; to include but not limited to all federal, state, and local granted STAA access routes.







Scale: 1:9027.977411

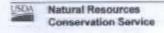
Date: 05/08/2012

Printed By:

cause of such or for any decision made, action taken, or action not taken by the user in reliance upon any maps or data provided herein. Please consult official County plats and records for official information.

Map Unit Legend

Louisa County, Virginia (VA109)				
Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI	
AcB	Abell silt loam, 2 to 7 percent slopes	1.5	4,7%	
NoB2	Nason silt loam, 2 to 7 percent slopes, eroded	13.0	40.3%	
NoC2	Nason silt loam, 7 to 15 percent slopes, eroded	16.9	52.3%	
RoB	Roanoke silt loam, local alluvium, 2 to 7 percent slopes	0.9	2.8%	
Totals for Area of Intere	at	32.3	100.0%	



Map Unit Legend

Louisa County, Virginia (VA109)				
Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of ADI	
AcB	Abell silt loam, 2 to 7 percent slopes	0:1	0.4%	
NoB2	Nason silt loam, 2 to 7 percent slopes, eroded	12.2	34,6%	
NoC2	Nason allt loam, 7 to 15 percent slopes, eroded	17.3	49.156	
NsC3	Nason silty day loam, 7 to 15 percent slopes, severely eroded	4.5	12.7%	
RoB	Roanoke silt loam, local alluvium, 2 to 7 percent slopes	1.1	3.2%	
Totals for Area of Interes	t ·	35.2	100.0%	

Map Unit Legend

Louisa County, Virginia (VA109)				
Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI	
NaD2	Nason loam, 15 to 25 percent slopes, eroded	0.6	1.7%	
NoB2	Nason silt loam, 2 to 7 percent slopes, eroded	12.1	36.1%	
NoC2	Nason silt loam, 7 to 15 percent slopes, eroded	19.8	58.7%	
RoB	Roanoke silt loam, local alluvium, 2 to 7 percent slopes	121	3.3%	
WH	Wehadkee-Chewacia complex	0.1	0.2%	
Totals for Area of Interest		33.7	100.0%	

Environmentally Sensitive Areas

Field	Reason for Sensitive Area
81-1	None
81-3	None
81-4	None

Louisa County Soils that are Environmentally Sensitive

Soil Map Unit	Series Name	Name Time of year		Environmental	
		High Water	Flooded		
AsB, AsC, AsD	Ashlar			Leaching	
AsC3, AsD3	Ashlar			Leaching	
AV	Ashlar			Leaching	
Ch	Chewacla	Nov - April	Nov April		
CIB	Colfax	Nov - June			
Eb	Elbert	Nov - May			
FN	Fluvaquents	Nov - April	Nov - April		
Fo	Forestdale	Jan - April	Jan - April		
FrB	Fork	Oct - May	Oct - May		
IdB	Iredell	Dec - April	CONTRACTOR DE		
IdB2, IdC2	Iredell	Dec - April			
IrA, IrB	Iredell	Dec - April			
Iv	Iredell	Dec - April			
LgB	Lignum	Dec May			
MnB, MnC, MnD	Madison			Shallow	
MoC, MoD	Madison			Shallow	
SeB, SeC, SeD	Sekil			Leaching	
SeC3	Sekil			Leaching	
SP	Sekil			Leaching	
To	Tocca		Jan - Dec	Market Committee	
Ts	Tocca		Jan - Dec		
We	Wehadkee	Nov-May	Nov - June		
WH	Wehadkee-Chewacla		Nov - June		
WoB	Worsham	Nov - May			

MAP LEGEND



House/Dwelling with a well



Rock Outcrop



Well



Lake/Pond



Slope which exceeds 15%



Intermittent Stream



Stream/River



Agricultural/Drainage Ditch



Field boundary



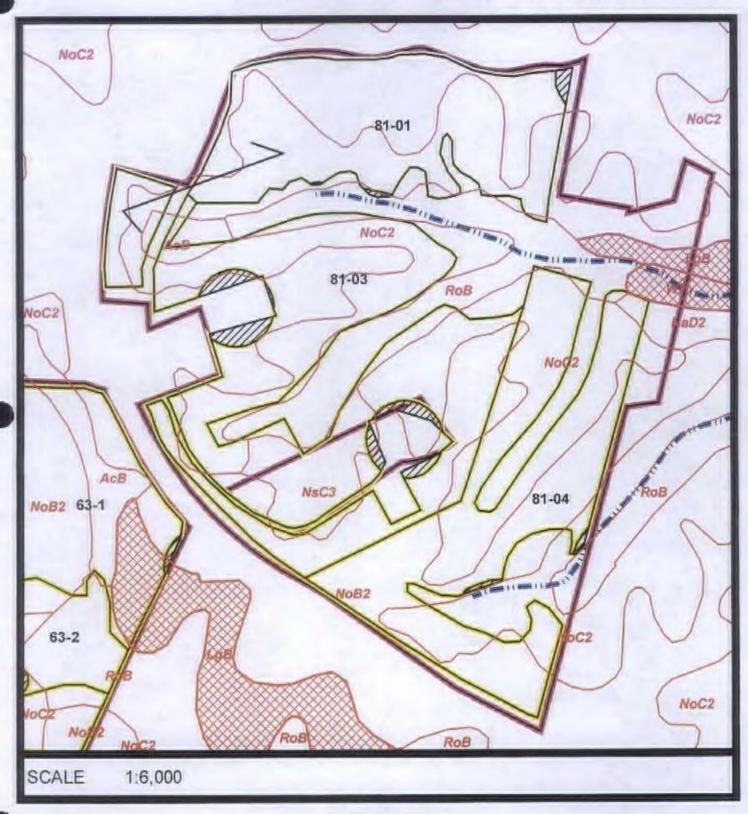
Property Line - (Standard 100'

Buffer, unless waiver issued)

Revised: Jan. 13, '14

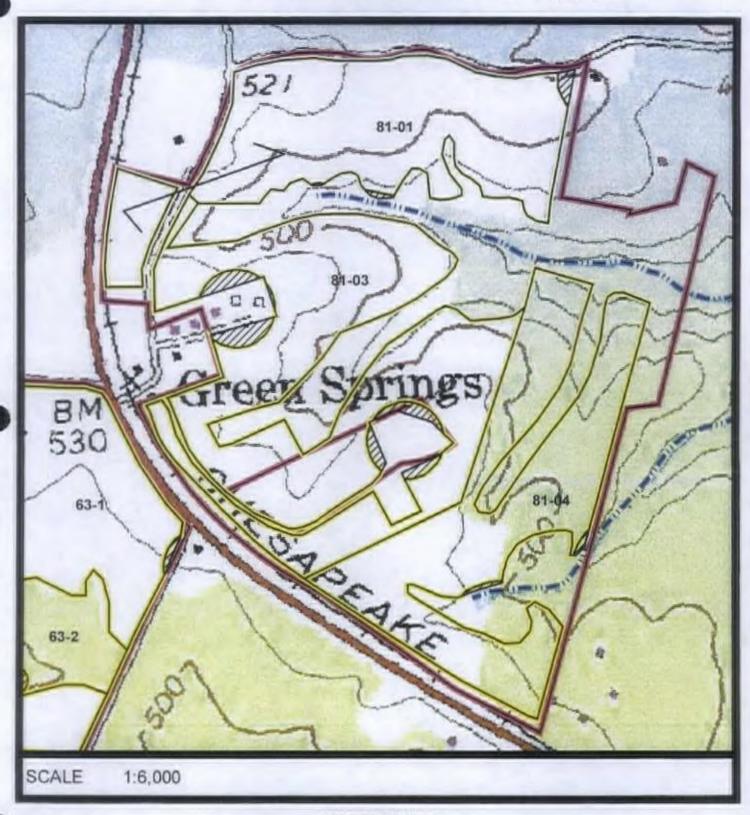


Stan Shifflett LO81 Fields 1, 3, 4



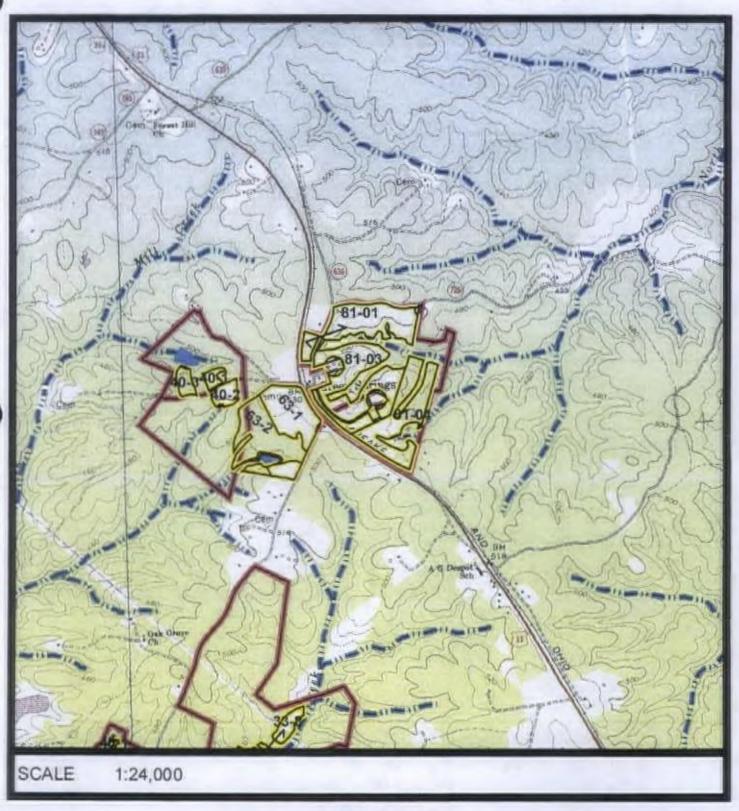
SOIL MAP

Stan Shifflett LO81 Fields 1, 3, 4

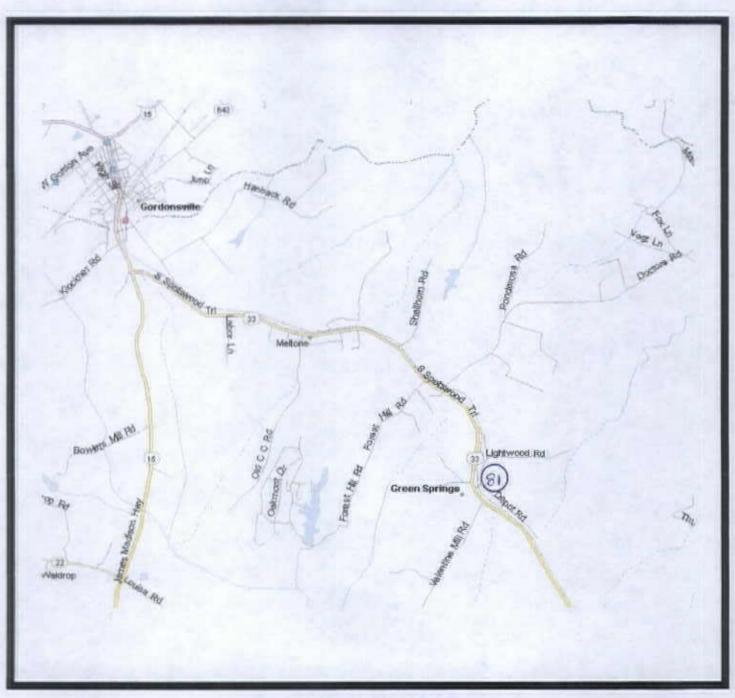


TOPO MAP

Stan Shifflett LO81 Fields 1, 3, 4



Stan Shifflett LO81 Fields 1, 3, 4



LOCATION MAP